

Tornado Awareness

Tornados are relatively short-lived local storms. They are composed of violently rotating columns of air that descend in the familiar funnel shape from thunderstorm cloud systems. The weather conditions that tend to generate tornados are unseasonably warm and humid earth surface air, cold air at middle atmospheric levels, and strong upper-level jet stream winds. Tornados can occur anywhere in the United States during any month of the year. In Missouri, tornados frequently occur in April, May and June.

The destructive path of a tornado averages about 250 yards in width and 15 miles in length. In extreme conditions, such as the tri-state tornado, a tornado may travel more than 300 miles and leave a path of total destruction more than a mile wide. Tornados will travel up to 60 mph, with wind speeds approaching 400 mph within the tornado's center. Tornados usually travel from a westerly direction to an easterly direction.

Signs and Warnings

Tornados develop during severe thunderstorms. If you are outside and see a funnel-shaped cloud with obvious rotating motion, it may be a tornado. As a tornado develops, it will produce a loud roar that grows louder as the funnel cloud touches the ground. When nearby, a tornado has a loud sound comparable to the combined roars of several jet engines.

The National Severe Storms Forecast Center in Kansas City issues tornado watches. Local National Weather Service offices issue tornado warnings. Local officials may sound sirens in a tornado warning.

A tornado watch indicates that conditions are right for a tornado to develop and the sky should be watched.

A tornado warning indicates a tornado has been sighted or is spotted on radar. Warnings will give the location of the tornado and the area immediately affected by the warning.

Preparedness

The best preparation for a tornado is to designate a safe place in or around your home as a tornado shelter. Tornado shelters are safest if they are underground. If you do not have a basement, find shelter in a bathroom near an inside wall of your house on the ground floor. Cover yourself with mattresses.

Plan tornado drills with your family so everyone knows what to do.

Know the location of the designated shelter where you work or go to school.

Mobil homeowners should plan to evacuate to a safe structure.

Make an inventory of your household furnishings and other possessions. Supplement the written inventory with photographs or video. Keep inventories and pictures in a safe deposit box or some other safe place away from the premises.

Response

If you have a storm cellar or shelter, go to it immediately with your family. If no shelter is available, go to your basement and get under a heavy workbench or stairs. Do not position yourself directly underneath heavy appliances on the floor above you. If your home has no basement, stay in the center of the house away from the windows or in a small room on the ground floor that is away from outside walls. Take cover under solid furniture or mattresses. Protect your head.

In mobile homes or vehicles, leave and take shelter in a substantial structure. If there is no nearby shelter, lie flat in the nearest ditch or ravine with your hands shielding your head.

In any large building, such as an office or department store, avoid all large, poorly supported roofs. Go to the basement or to an inner hallway on a lower floor.

Do not drive. You are safer in a home or basement shelter than in a car.

If you are driving in a city and spot a tornado, get out of your car and go to a nearby building.

If you are driving in open country, drive at a right angle away from the tornado's path if you can safely do so. Do not try to outrun the storm. If you cannot avoid the tornado, get out of your car. Lie flat in the nearest depression, such as a ditch, culvert or ravine. Protect your head and stay low to the ground.

After a tornado passes, keep tuned to the local radio or TV station to get an all-clear signal before leaving your shelter. Sometimes more than one tornado will develop during a violent storm.

Re-enter buildings with extreme caution. Be alert to fire hazards such as broken electric wires or damaged electrical equipment, gas or oil leaks, or smoldering piles of wet hay or feed. Report utility damages to the appropriate authorities. Have damage to your property assessed by your insurance company.

Fujita Scale

F0 – Gale Tornado (40-72 mph) causes some damage to chimneys. Tree branches will be broken, Shallow trees will be uprooted.

F1 – Moderate Tornado (73-112 mph) peels surface off roofs. Mobile homes are overturned. Moving automobiles are pushed off the roads.

F2 – Significant Tornado (113-157 mph) tears roofs off frame houses. Large trees are snapped or uprooted. Light objects become airborne missiles.

F-3 Severe Tornado (158-206 mph) roofs and some walls are torn off well-constructed homes. Trains are overturned. Most trees in forests are uprooted. Heavy cars are lifted off the ground.

F-4 Devastating Tornado (207-260 mph) levels well-constructed houses. Structures with weak foundations are blown some distance. Cars are thrown and large missiles are generated.

F-5 Incredible Tornado (261-318) strong frame houses are lifted off foundations and disintegrate. Trees are debarked. Cars fly through the air in excess of 100 mph.